

but the male still bore the right leg; of this leg, merus, carpus, palm, and fingers were respectively 7.1 mm., 10.3 mm., 6.4 mm., and 4.5 mm. long. According to these measurements the leg of the second pair has probably been wrongly shown in fig. 3 of plate xi. of the 'Novara-Reise,' for in that figure the chela appears once and a half as long as the carpus; the palm appears probably too broad. The rostrum appears in that figure a little longer and more slender than in our adult male, but, as has already been observed, the form and the length of the rostrum are variable in our species; the fact that the lower margin bears only three teeth may be a juvenile character, Heller's species being only 70 mm. long. According to Koelbel the dactylus of the second legs should carry five teeth near the articulation, the immobile finger hardly traces of two, or, perhaps, three small teeth—just the contrary of what is seen in our male.

The examination of a series of specimens of different ages is therefore necessary to decide this question of identity.

Should, however, our species eventually prove to be different from *Pal. danæ*, the name of *Pal. (Eupal.) novæ-hollandiæ* is proposed for it.

EXPLANATION OF PLATE XVI.

Fig. 1. Lateral view of rostrum and carapace, $\times 2$.

Fig. 2. Ischium and merus, $\times 1\frac{1}{3}$.

Fig. 3. Carpus and chela of the right leg of the second pair, $\times 1\frac{1}{3}$.

Fig. 4. Fingers of the same leg, $\times 2$.

Fig. 5. Toothing of these fingers, $\times 4$.

Fig. 6. View of a part of the palm of the same leg, just in the middle, the inner margin being at the left hand, $\times 12$.

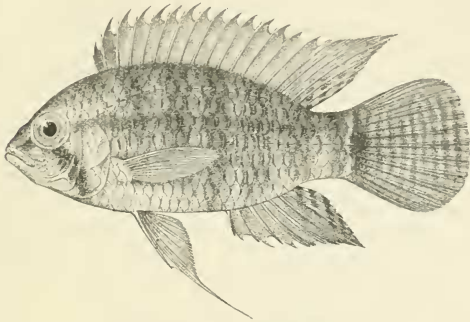
Fig. 7. Leg of the third pair, $\times 2$.

LX.—*Description of a new Cichlid Fish of the Genus Heterogramma from Demerara.* By C. TATE REGAN, M.A.

Heterogramma steindachneri, sp. n.

Depth of body $2\frac{2}{5}$ to $2\frac{3}{5}$ in the length, length of head $2\frac{4}{5}$ to 3. Snout as long as diameter of eye, which is $3\frac{1}{5}$ to $3\frac{1}{2}$ in the length of head and equal to or a little greater than the interorbital width; depth of præorbital $\frac{2}{5}$ to $\frac{3}{5}$ the diameter of eye. Maxillary reaching the vertical from anterior edge of eye; jaws equal anteriorly; fold of the lower lip continuous; cheek with 3 or 4 series of scales; not more than 5 or 6

gill-rakers of the outer series on the lower part of the anterior arch. Scales $24\frac{3}{8}$; upper lateral line extending to below end of spinous dorsal, from which it is separated by 1 or $1\frac{1}{2}$ series of scales for most of its course. Dorsal XV 7, the spines increasing in length to the last, which is more than $\frac{1}{2}$ the length of head; twelfth spine equal to or a little more than $\frac{1}{2}$ the length of head. Anal III 6; third spine less than $\frac{1}{2}$ the length of head. Pectoral a little shorter than the head,



Heterogramma steindachneri.

extending to above the origin of anal. Caudal rounded; caudal peduncle deeper than long. Brownish; a dark lateral stripe from eye to base of caudal; a dark stripe from eye to upper lip, another from eye to interoperculum; dark cross-bands on the posterior part of the body; vertical fins dusky; membrane between first three spines of the dorsal blackish; posterior part of soft dorsal and anal with oblique stripes; caudal with transverse stripes and with a dark spot at the base.

Hab. Georgetown, Demerara.

Two specimens, 70 and 75 mm. in total length.

Closely allied to *H. agassizii*, Sdr., and to *H. amœnum*, Cope, which have a different coloration, whilst the former is also distinguished by the more slender form, the latter by the lower spinous dorsal fin. This is probably the species described from the Amazon by Steindachner (Sitzungsber. Ak. Wien, lxxi. 1875, p. 115) as *Geophagus tenuatus*, Gthr., but which differs from the last-named species in the deeper body, shorter fin-spines, smaller eye, &c.